P-3 Orion 04/03/18

Aircraft: P-3 Orion - WFF (See full schedule)
Flight Number: 2018 OIB Arctic -Science #2
Payload Configuration: 2018 OIB Arctic
Nav Data Collected: No
Total Flight Time: 7.9 hours
Submitted by: Janet Letchworth on 04/03/18
Flight Segments:

From:	BGTL	**To:**	BGTL
Start:	04/03/18 10:53 Z	**Finish:**	04/03/18 18:47 Z
Flight Time:	7.9 hours		
Log Number:	18P008	**PI:**	Nathan Kurtz
Funding Source:	Bruce Tagg - NASA - SMD - ESD Airborne Science Program		
Purpose of Flight:	Science		
Comments:	The flight covered the Nansen Gap line.		

Flight Hour Summary:

	18P008
Flight Hours Approved in SOFRS	201.2
Total Used	190.4
Total Remaining	10.8

18P008 Flight Reports

Date	Flt #	Purpose of Flight	Duration	Running Total	Hours Remaining	Miles Flown
03/13/18	2018 OIB Arctic - Airworthiness Test Flight	Other	0.8	0.8	200.4	
03/14/18	2018 OIB Arctic -Project Test Flight - Laser	Other	2.6	3.4	197.8	
03/15/18	2018 OIB Arctic -Project Test Flight - Radar	Other	5.7	9.1	192.1	
03/18/18	2018 OIB Arctic -delta ATF	Other	0.8	9.9	191.3	
03/20/18	2018 OIB Arctic -Transit to Thule	Transit	7.9	17.8	183.4	
03/22/18	2018 OIB Arctic - Science #1	Science	7.8	25.6	175.6	
04/03/18	2018 OIB Arctic - Science #2	Science	7.9	33.5	167.7	
04/04/18	2018 OIB Arctic - Science #3	Science	8.1	41.6	159.6	
04/05/18	2018 OIB Arctic - Science #4	Science	8	49.6	151.6	
04/06/18	2018 OIB Arctic - Science #5	Science	8.8	58.4	142.8	
04/07/18 - 04/08/18	2018 OIB Arctic - Science #6	Science	8.1	66.5	134.7	
04/08/18 - 04/09/18	2018 OIB Arctic - Science #7	Science	8.3	74.8	126.4	
04/14/18 - 04/15/18	2018 OIB Arctic - Science #8	Science	7.7	82.5	118.7	
04/16/18	2018 OIB Arctic - Science #9	Science	8.2	90.7	110.5	

04/18/18	2018 OIB Arctic - Science #10	Science	8	98.7	102.5
04/19/18	2018 OIB Arctic - Science #11	Science	7.7	106.4	94.8
04/20/18	2018 OIB Arctic -Transit to Kanger	Transit	4.2	110.6	90.6
04/21/18	2018 OIB Arctic - Science #12	Science	8.1	118.7	82.5
04/22/18	2018 OIB Arctic - Science #13	Science	6.5	125.2	76
04/23/18	2018 OIB Arctic - Science #14	Science	8.2	133.4	67.8
04/25/18	2018 OIB Arctic - Science #15	Science	7.7	141.1	60.1
04/26/18	2018 OIB Arctic - Science #16	Science	8.8	149.9	51.3
04/27/18	2018 OIB Arctic - Science #17	Science	8	157.9	43.3
04/29/18	2018 OIB Arctic - Science #18	Science	8.3	166.2	35
04/30/18	2018 OIB Arctic - Science #19	Science	9.3	175.5	25.7
05/01/18	2018 OIB Arctic - Science #20	Science	7.4	182.9	18.3
05/03/18	2018 OIB Arctic -Return Transit Leg #1	Transit	6.4	189.3	11.9
05/03/18	2018 OIB Arctic -Return Transit Leg #2	Transit	0.6	189.9	11.3
05/03/18	2018 OIB Arctic -Return Transit Leg #3	Transit	0.5	190.4	10.8

Flight Reports began being entered into this system as of 2012 flights. If there were flights flown under an earlier log number the flight reports are not available online.

Related Science Report:

OIB - P-3 Orion 04/03/18 Science Report

Mission: OIB

Mission Summary:

OIB completed the high priority Nansen Gap mission. This is a modified version of the Fram Gateway missions flown in the earlier years of IceBridge. It differs from them in that it transits to and from the area of the Fram Strait at high-altitude, leaving more time to sample ice farther north and east than in prior years. The mission was selected to broaden our coverage in the eastern Arctic as much as possible with the absence of Svalbard based missions this year. The mission was also slightly modified to underfly an opportunistic Sentinel-3A orbit across the Fram Strait with the satellite passing over 1 hour and 13 minutes after we had left the line. In addition to Level 1 Requirements SI1 and SI2, this mission addresses sea ice level 1 baseline requirements SI3c and by sampling sea ice north of Fram Strait.

Weather along the survey line was good through most of the flight. Heavier clouds near the beginning of the line were present which slightly delayed our descent from high altitude and some occasional light haze as present at times throughout the flight, though not enough to significantly impact data collection. ATM had a few start-up issues with about 5 minutes of data lost at the beginning of the flight, but otherwise performed well with no other issues. DMS, snow radar, and all other instruments also collected good data throughout the line making for an overall good mission.

Data Volumes

ATM T6: 63 Gb
ATM T7: 97 Gb
CAMBOT: 37 Gb
FLIR: 7 Gb
KT19: 10 Mb
DMS: 52.2 Gb

Snow radar: 693 Gb
MCoRDS: Calibration data only
Accumulation radar: No data (sea ice)

Data on: 1257
Data off: 1611

File:
Nansen_Gap.pdf
Submitted by: Nathan T. Kurtz on 04/03/18

Page Last Updated: April 22, 2017

Page Editor: Brad Bulger

NASA Official: Bruce A. Tagg

Source URL: https://airbornescience.nasa.gov/flight_reports/P-3_Orion_04_03_18#comment-0